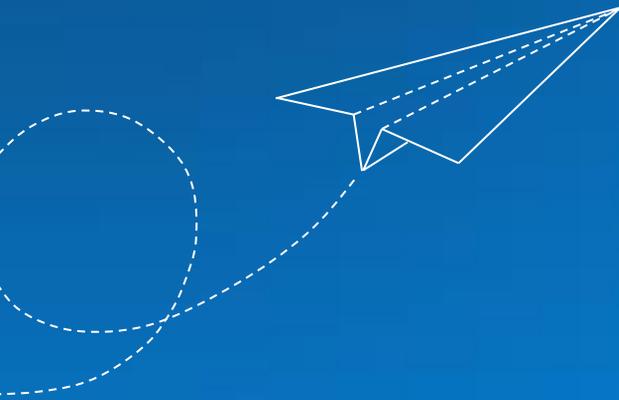


AEROSPACE BUSINESS INTEGRATION PROFESSIONAL EDUCATION

*In a world class partnership
between industry and academia, ECATA provides
unique professional development opportunities aimed
at the future leaders of aerospace businesses*



Target population are high-flyers having 5 to 15 years experience,
being selected to become leaders in European and international programmes.

ECATA is jointly run by the leading European aerospace manufacturers and universities,
supported by players from the operational, regulatory and research world.

AIRBUS
GROUP

 **FINMECCANICA**

BAE SYSTEMS

 **DASSAULT**
AVIATION



LIEBHERR

 **SAAB**

 **SAFRAN**
AEROSPACE. DEFENCE. SECURITY.

Cranfield
UNIVERSITY

 **elsiae**

 **KTH**
ROYAL INSTITUTE
OF TECHNOLOGY

 **Isae**
SUPERERO



POLITECNICO
DI TORINO

 **TU Delft**
Technische Universiteit Delft

TUM

ECATA ABI COURSE: The premier choice of training intervention for global aerospace companies when looking to enhance the leadership capabilities of their future programme directors.

The Aerospace Business Integration Programme provides dedicated and unique training opportunities specifically aimed at the future leaders of aerospace businesses. The cooperation and partnership of leading companies and universities, together with the diversity of the ECATA trainees, offers an unique opportunity to build and develop an international personal and business network across organizations, borders and professional functions.

Main Topics

- International Aerospace Environment
- System Architecture and Integration
- Product life cycle and supply chain management
- Multinational Programme Management
- Multicultural team work (seminars, workshops ...)
- Team Building, Cultural Awareness and Leadership

Course Aims and Components

The ECATA ABI course focusses on programme management in multicultural environment. The cornerstone of the course is a TEAM PROJECT with high relevance to the business.



Course Added-Value and Participants Benefits

- Develop skills and experience needed to lead a team/programme in a international/intercultural multi-partner aerospace environment
- Have a broad view of the aerospace industry environment: markets, business models, strategies, regulations...
- Get the ability to understand aerospace engineering from an overall perspective
- Experience multicultural cooperation, multinational team building and team working
- Take advantage of knowledge of other players and be aware of working practices of other companies
- Discover their talents beyond own limits (knowledge of own personality and self-awareness)
- Become part of an active network of fellow professionals and experts

ECATA is an innovative lab for training and experimenting new tools and capabilities for learning in industry. It offers the delegate at no risk (neither personal nor for the employer), the opportunity to practise program/project management, team building and leadership development in a multicultural multicompany environment similar to the real professional life. Innovative learning methods based on more than twenty years experience have been developed by the Consortium who delivers also the content, supported by players from the operational, regulatory and research world.

Aerospace Business Integration Course Syllabus

Block 1 (42 hrs)

International Aerospace Environment

Global A&D Business Environment

- Issues when launching a new product
- Customer expectations (Airlines, Air forces....)
- Business case and financing

Europe, US, Asian and BRIC Countries Markets

European Industry Consolidation

Policy and Legal Issues

- EU & governments policies
- EASA: European airworthiness issues

Block 1 aims at providing a global comprehensive overview of the moving Aerospace Business environment. A new programme means much more than developing a technically sound product. It must meet customers performance needs at right time, competitive price and low operational costs. Huge investments should be made in due time with risk-sharing between partners, often at international level implying political negotiations.

Block 2 (30 hrs)

System Integration & Technologies

Research and Technology State of the Art

Design Cycle

System Integration

Cases Studies on Complex Integrated Systems

- Aerodynamics, Wings, Propulsion
- Avionics, Fly-by-Wire
- Payload: passengers, weapons

Block 2 illustrates the design and development of a complex product together with the main methodologies and tools involved in the integration process. Production, operation and maintenance constraints should be taken into account in the early phase of the design. The multinational context and its associated problems cannot be ignored. A particular focus is given on "systems of systems" approach.

Block 3 (34 hrs)

Multinational Programme Management

Aerospace Programme Management in a Multipartners Multinational Environment

- Project planning • Risk and Quality
- Ressources management • Product support
- Monitoring and Control • Cost control

Supply Chain Management

Project Management Case Studies

- Civil and Military

Team Project Management Coaching

Block 3 deals with the methods to be used for Programme Management within aerospace companies operating in a multinational environment for the development of large and costly aerospace programmes. To learn these accurate management methods (phasing, organisation, quality management process and cost control), interactive lectures/seminars and case studies have been developed. The techniques are put into practice while working on the Multinational Team Project.

Seminars (48 hrs)

Team Building

- Understanding ourselves, our organisation
- Models of team development, Team performance

Cultural Awareness

- Communication in multicultural environment
- Cultural difference effects in teams, Role of Values

Leadership

- Decision making and problem solving
- Influencing others and negotiating, Motivating

These seminars aim at allowing the ECATA delegates in reaching one of the goals of the course: The ability to work efficiently in multinational teams, an asset of critical importance for successful development of programmes with international cooperation. The seminars combine theory, practical exercises and role-playing games to offer the delegates the opportunity of knowing and evaluating oneself and knowing each other...

Multinational Team Project

(300 hrs)

The MTP is proposed by industry with a high level topic broken down into typically four Specific Team Projects (STP).

The full picture of MTP findings is presented in front of ECATA professionals (industry and institutes) and ECALAS representatives.

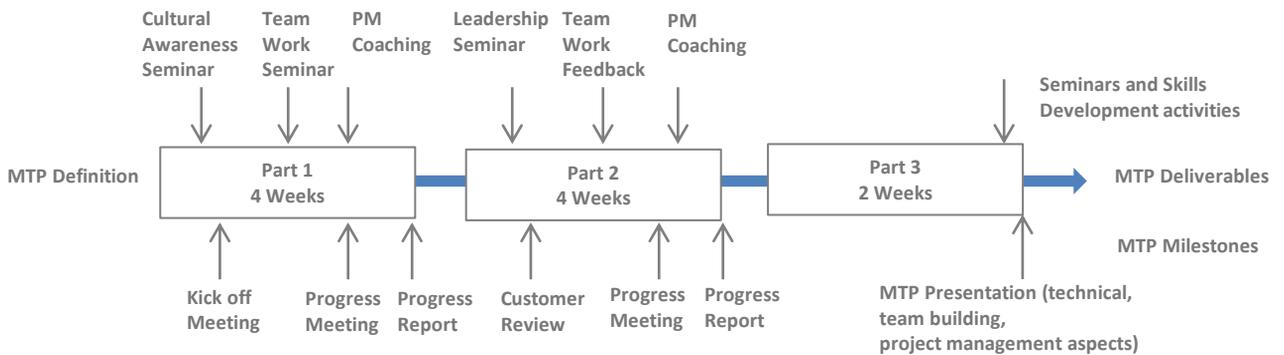
- 2012 - “The Air Vehicle Life Cycle Environmental Balance” - Safran
- 2013 - “Right First Time” - Airbus & BAE Systems
- 2014 - “Small Series and Highly Customized Aircrafts” - Dassault Aviation
- 2015 - “The successful Management of Aerospace Programmes for 2020 and beyond” - BAE Systems.

The Multinational Team Project gives the delegates at no risk (neither personal nor for the employer), the opportunity to practise project management, teamwork and leadership in a multicultural and multi-company environment similar to the real professional life (different nationalities and company working practices, milestones, customer pressure ...).

ABI Course Organisation

The ECATA ABI course is conducted each year between January and April, during 10 weeks off the job training at different ECATA universities (different countries). The course is organized in three intensive residential sessions, participants returning to their home workplace in between.

Lectures are distributed over PART 1 & PART 2; MTP spans the whole duration, PART 3 being fully dedicated.



European Consortium for Advanced Training in Aerospace

The mission of ECATA is to strengthen European aerospace industry by offering a unique Aerospace Business Integration (ABI) course for high potential professionals from the business.

The ECATA members from Academic Institutes and Industry, together with ECALAS, have over 25 years of cooperation and networking experience, in sustaining position and competitiveness of Europe in the worldwide Aerospace market.

- More than 400 graduates are members of the ECALAS Alumni association www.ecalas.com
- 1500 European aerospace professionals have been involved in the ECATA initiatives.

Lectures, workshops, seminars, coaching are given by professionals from industry, agencies, airlines, European Commission, academia, ... More than 500 highly qualified lecturers have actively contributed to the success of the ECATA programme.

ECATA ABI – Key Differentiators

- Not just another training initiative or just another course in project management.
- A unique programme designed and operated through active industry/academia collaboration
- Specific to address Aerospace & Defence international challenges
- Taught by recognized experts throughout the world-wide aerospace community
- Lecturers from other industries as well as universities
- New skills development by evolving training lab focussed on business dynamics
- Working in team with high flyers, in a multinational/multicultural environment
- Broad view at the overall industry level, not only because of lecturers from various industry fields, but also due to the attendees mix
- Opportunity to gain insights into other businesses outside the perimeter of the “home organisation”
- Opportunity to increase the intercultural awareness by hands-on practical experience. Planned to be expanded beyond Europe
- Provides opportunity to join an industry-wide network of aerospace professionals to share experiences and increase awareness of the issues affecting the global aerospace industry

ECATA ABI – The Specific Added Value

- Delegates gain experience of different company cultures outside their home organisation
- Delegates are driven to perform beyond their “comfort zone” in a demanding multicultural, but ultimately safe environment
- Delegates obtain an understanding of the global Aerospace landscape, trends, challenges
- Delegates improve their leadership capabilities in demanding multinational environments
- Delegates enter a long lasting relationship with a unique international network, the ECALAS network

- Companies benefit from shared best practices
- Companies increase their pool of experienced international managers
- Companies benefit from improved strategic thinking and ability to proactively manage resulting risks and opportunities
- Companies train potential candidates for their future leadership positions
- Companies benefit from sustained cross-fertilization

Typical ECATA Delegate Profile

To ensure each course has the maximum effectiveness for both the participating companies and their delegates it is important the delegates share a certain personal profile.

Highly Desirable

Performance

- Clearly rated within internal HR systems as High Potential and High Performance
- Against the Towers Watson Global Grading System (TWGG) a delegate grade would be in the range 10 to 14.
- Has the potential to be promoted two grades within 5 years (already on succession plans)
- Exhibits the "X Factor" – a combination of attributes that suggest the Whole is more than the sum of the parts.

Experience

- 5 to 10 Years with an aerospace business (Either as an engineer or in another function with a close working relationship)
- Recognised as a subject matter expert in one discipline
- Worked across multiple phases of a Product or Service lifecycle
- Worked with other business functions

Qualifications

- Primary Qualification is a recognised engineering degree or equivalent.
- For non-engineering delegates a degree is expected
- Basic Project Management
- Quality Management

Desirable

Performance

- Will actively take a Leadership role in difficult circumstances
- Can understand, interpret and communicate the organisation's vision, mission and values.
- Can manage complexity
- Demonstrable successes achieved

Experience

- Worked on multiple projects
- Project management
- Lean Thinking and Techniques
- 6 Sigma
- CMMI

Qualifications

- Intermediate Project Management
- Management Courses

Behaviours

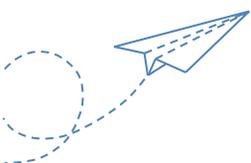
- Positive attitude in all situations. Consistently demonstrates a "Can Do – Will Do" approach
- Strong inter-personal skills
- Commits to continuous development of themselves and others
- Acts as change agent and role model for values in your organization
- Moves outside of comfort zone – take chances by working across boundaries
- Willingness to relocate domestically or internationally

More information at www.ecata.eu

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ECALAS

ECATA Alumni Association

KEY FIGURES

- **non profit organisation under the French Law**
- **network of more than 400 ECATA Alumni throughout the European Aerospace Industry**
- **25 companies, research centres and government agencies involved**
- **500 European professionals involved**
- **20 ECATA Follow-Up Seminars**
- **ca. 100 Multinational Team Projects**